

AMENDMENTS TO THE CLAIMS:

This listing of claims replaces all prior versions and listings of claims in the application:

LISTING OF THE CLAIMS:

1. (Currently Amended) A method for use with an integrated circuit that is light-sensitive, the method comprising:

applying different wavelengths of light to the integrated circuit, the integrated circuit producing output signals in response to the different wavelengths of light;

measuring the output signals to obtain measured values;

comparing the measured values to setpoint values that correspond to the different wavelengths of light;

obtaining correction values for the different wavelengths of light, the correction values being based on comparison of the measured values to the setpoint values; and

storing the correction values on the integrated circuit;

wherein the integrated circuit is on a semiconductor substrate;

wherein the method is performed using a testing card; and

wherein the different wavelengths of light are applied via light-emitting diodes that are mounted atop the testing card

wherein the measured values define a sensitivity curve; and

~~wherein a smallest interval between two of the different wavelengths on the sensitivity curve is smaller than an interval between a local sensitivity maximum and a local sensitivity minimum on the sensitivity curve.~~

2 to 4. (Cancelled)

5. (Currently Amended) The method of claim 17 [[5]], further comprising:
obtaining the sensitivity curve by interpolating between the measured values; and
storing information about the sensitivity curve on the integrated circuit.

6. (Previously Presented) The method of claim 1, wherein the integrated circuit comprises one or more photodiodes.

7. (Previously Presented) The method of claim 1, wherein the correction values are stored using Zener diodes on the integrated circuit.

8. (Currently Amended) A semiconductor chip comprising:
a light-sensitive integrated circuit that stores information for use in correcting a wavelength-dependent output signal of the light-sensitive integrated circuit; and
a temperature sensor for measuring a temperature of an external light source that
illuminates the light-sensitive integrated circuit, the light-sensitive integrated circuit for

producing the wavelength-dependent output signal in response to light from the external light source;

wherein the light-sensitive integrated circuit stores correction data that is derived using the temperature of the external light source, the correction data for use in correcting the wavelength-dependent output signal

~~wherein the light-sensitive integrated circuit has a wavelength-dependent sensitivity; and wherein a smallest interval between two measured wavelengths of the wavelength-dependent output signal is smaller than an interval between a local sensitivity maximum and a local sensitivity minimum on a sensitivity curve defined, in part, by the two measured wavelengths.~~

9. (Cancelled)

10. (Currently Amended) A method for use with an integrated circuit that is light sensitive, the method comprising:

illuminating the integrated circuit using an external light source, the integrated circuit producing an output signal in response to light from the external light source;

providing, to the integrated circuit, information about the wavelength of the light from the external light source; and

~~using the information to correct the output signal;~~

measuring a temperature of the external light source;

correcting the information about the wavelength of the light using the temperature to thereby produce corrected information; and

correcting the output signal using the corrected information

~~wherein the integrated circuit has a sensitivity that is wavelength-dependent; and~~

~~wherein a smallest interval between two measured wavelengths of the output signal is smaller than an interval between a local sensitivity maximum and a local sensitivity minimum on a sensitivity curve defined, in part, by the two measured wavelengths.~~

11. (Cancelled)

12. (Currently Amended) The method of claim 10, wherein ~~using the information to correct the output signal comprises~~^{[[:]]} obtaining a correction value that corresponds to the wavelength of light; and
applying the correction value to the output signal.

13. (Previously Presented) The method of claim 12, wherein the correction value comprises a difference between a setpoint value and the output signal at the wavelength.

14. (Previously Presented) The semiconductor chip of claim 8, further comprising:
a semiconductor substrate on which the light-sensitive integrated circuit is mounted.

15. (Previously Presented) The semiconductor chip of claim 8, wherein the light-sensitive integrated circuit comprises one or more photodiodes for receiving different wavelengths of light.

16. (Previously Presented) The semiconductor chip of claim 8, further comprising one or more Zener diodes for use in storing the information.

17. (New) The method of claim 1, wherein the measured values define a sensitivity curve; and

wherein a smallest interval between two of the different wavelengths on the sensitivity curve is smaller than an interval between a relative maximum and a relative minimum on the sensitivity curve.

18. (New) The semiconductor chip of claim 8, wherein the light-sensitive integrated circuit has a wavelength dependent sensitivity; and

wherein a smallest interval between two measured wavelengths of the wavelength-dependent output signal is smaller than an interval between a relative maximum and a relative minimum on a sensitivity curve defined, in part, by the two measured wavelengths.

19. (New) The method of claim 10, wherein the integrated circuit has a sensitivity that is wavelength-dependent; and

wherein a smallest interval between two measured wavelengths of the output signal is smaller than an interval between a relative maximum and a relative minimum on a sensitivity curve defined, in part, by the two measured wavelengths.